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SPECIAL DATA COLLECTION SYSTEM (SDCS) EVENT REPORT,  
EASTERN KAZAKH, 8 JUNE 1975

J. R. Woolson, et al

Teledyne Geotech

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**SPECIAL DATA COLLECTION SYSTEM EVENT REPORT ✓**  
**Eastern Kazakh, 8 June 1975**

**J.R.Woolson, D.D.Solari, M.S.Dawkins, K.J.Hill, and R.J.Markle**  
**Alexandria Laboratories ✓**

**Teledyne Geotech, 314 Montgomery Street, Alexandria, Virginia 22314**

**September 1975**

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SDCS Event Report No. 24

Eastern Kazakh, 8 June 1975

This event report contains seismic data from the Special Data Collection System (SDCS), and other sources for the above event. Published epicenter information from seismic observations is:

	Origin Time	Latitude	Longitude	$m_b$	$M_s$
NORSAR	03:27:01	50.2N	077.6E	5.5	N/A
LASA	03:26:56	48.2N	079.6E	5.6	N/A
Hagfors Array, Sweden	03:27:24	52 N	075 E	6.2	N/A

Using SDCS stations, LASA and NORSAR, the epicenter location and magnitudes become

03:27:00	49.8N	077.8E	5.3	3.6
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Short-period signals associated with this event were recorded at all SDCS stations, LASA and NORSAR.

Analysis of SDCS, LASA and ALPA long-period data failed to produce recognizable signals associated with this event. The LP vertical magnification at HN-ME is unknown due to calibration problems. The horizontal LP gains at HN-ME are unknown due to erratic calibration amplitudes and, therefore, were not rotated to orientations radial and transverse to this event location. The horizontal array beams from NORSAR were unrecoverable.

Details of the program used to obtain beamed vertical, radial and transverse long-period data at LASA, ALPA and NORSAR are in the process of being reviewed. Vertical beams are probably valid while horizontal beams are questionable.

Scaling factors on plots are millimicrons at 1 Hz (not corrected for instrument response) with the exception of LASA and NORSAR short-period plots. LASA SP scaling factors are millimicrons per inch. Scaling factors are not reported for NORSAR short-period.

# STATION DESCRIPTION

SITE CODE	LOCATION	SITE COORDINATES		ELEVATION METERS	INSTRUMENTATION	
		DEG	MN SECS		SHORT-PERIOD	LONG-PERIOD
ALPA	Alaska	65 14	00.0 N 147 44 36.0 W	626	None	31300
CPSO	McMinnville, Tennessee	35 35	41.4 N 085 34 13.5 W	574	6480 V 7515 H	SL210 V SL220 H
FN-WV	Franklin, West Virginia	38 32	58.0 N 079 30 47.0 W	910	KS36000	KS36000
LASA	Billings, Montana	46 41	19.0 N 106 13 20.0 W	744	HS10	7505A V 8700C H
HN-ME	Houlton, Maine	46 09	43.0 N 067 59 09.0 W	213	18300	SL210 V SL220 H
NORSAR	Kjeller, Norway	60 49	25.4 N 010 49 56.5 E	379	HS10	7505A V 8700C H
RK-ON	Red Lake, Ontario	50 50	20.0 N 093 40 20.0 W	366	18300	SL210 V SL220 H
WH2YK	White Horse, Yukon	60 41	41.0 N 134 58 02.0 W	853	18300	SL210 V SL220 H

# HYPOCENTER DETERMINATION

INPUT FOR EVENT 8 JUN 75  
03:27:00.0 48.000N 79.000E 0KM.

STA.	ARRIVAL	RESIDUALS		DIST.	AZ.
		CAIC	REST	REST	REST
NAO	03 34 18.4	-0.1	-0.1	38.0	312.9
WH2YK	03 37 51.6	-0.0	-0.1	66.7	16.8
RK-CN	03 39 06.8	-0.6	-0.5	79.5	354.5
HN-ME	03 39 10.6	0.7	0.9	79.9	336.6
LAC	03 39 30.9	0.6	0.5	83.8	2.8
FN-WV	03 39 59.5	0.0	-0.0	89.8	342.4
CPO	03 40 17.1	-0.7	-0.7	93.7	346.5

## 67 HERRIN TRAVEL TIME TABLES

ORIGIN	LAT.	LCNG.	DEPTH (KM)	SDV	IT	STA
NO CONVERGENCE ON CALC RUN						
03:26:41.2	49.268N	78.003E	-101. CALC	0.5	16	7
03:27:00.1	49.798N	77.804E	0. REST	0.5	3	7

CAIC  
4 . 2  
1 . 0  
0 0. 0 0  
0 . 0. 0 0  
0 . 0  
0 . 0

REST  
4 . 2  
1 . 0  
0 0. 0 0  
0 . 0. 0 0  
0 . 0  
0 . 0

CHI2 COVERAGE ELLIPSE; 95 PER CENT CONF..LEVEL, SDV= 0.92  
MAJOR 164.0KM. MINOR 40.8KM. AZ= 179 AREA= 21029 SQ.KM. REST

# DATA SUMMARY

INPUT FOR EVENT 8 JUN 75  
03:27:00.0 48.000N 79.000E 0KM.

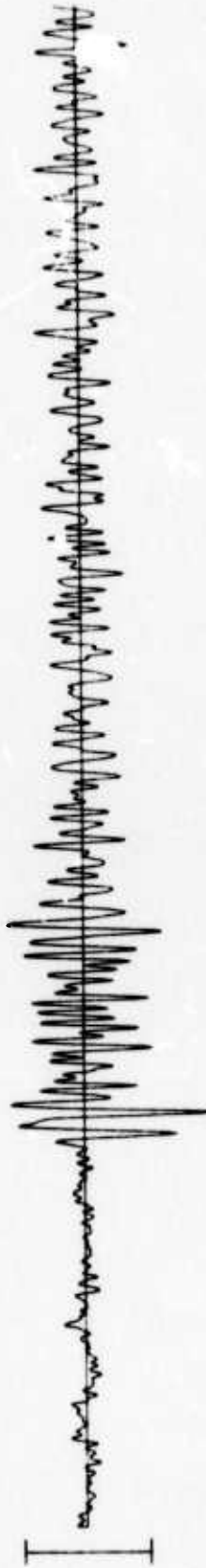
STA.	PHASE	ARRIVAL			INST	PER	A/T	MAGNITUDE		DIR	DIST
		TIME						MB	MS		
NAO	EP	03 34	18.4		AB	0.6	89.	5.15			38.0
NAO	LR	03 50	17.0		LAB	19.0	8.		3.60		38.0
WH2YK	EP	03 37	51.6		SPZ	0.8	107.	5.73			66.7
RK-ON	EP	03 39	06.8		SPZ	0.5	56.	5.20			79.5
HN-ME	EP	03 39	10.6		SPZ	0.7	27.	4.84			79.9
LAC	EP	03 39	30.9		AB	0.9	53.	5.42			83.8
FN-WV	EP	03 39	59.5		SPZ	0.8	25.	5.10			89.8
CPO	EP	03 40	17.1		SPZ	0.8	43.	5.46			93.7

ORIGIN	LAT.	LONG.	DEPTH (KM)	MAG	SDV	STA	LPMAG	LPSDV	LPSTA
03:27:00.1	49.798N	77.804E	0. REST	5.27	0.29	7	3.60*****		1



WH2YK 8 JUN 75

03:37:51.6



10 SEC

03:38:00

5<

RK-ON 8 JUN 75

03:39:06.8

SPZ  
54.20 MP



SPR  
15.79 MP



SPT  
14.01 MP



TIME



03:39:20

10 SEC

6<

HN-ME 8 JUN 75

03:39:10.6

SPZ  
28.49 MP



SPR  
13.23 MP



SPT  
21.45 MP



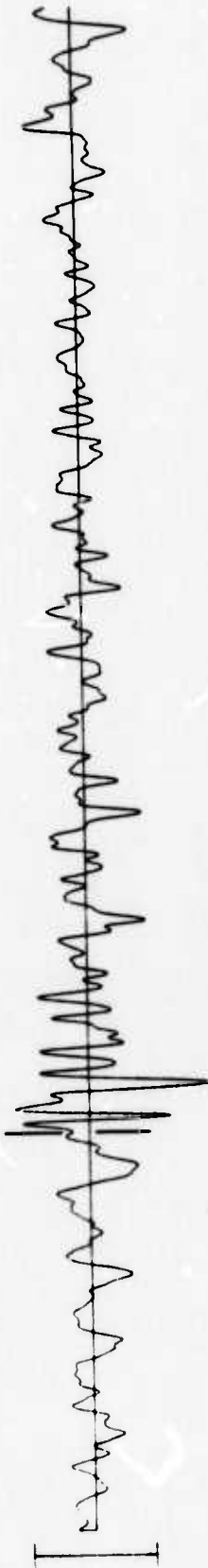
10 SEC

2<

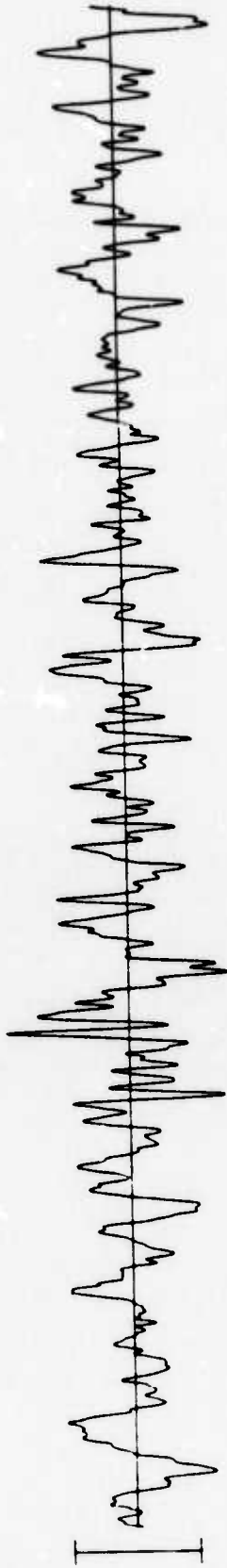
**FN-WV 8 JUN 75**

**03:39:59.5**

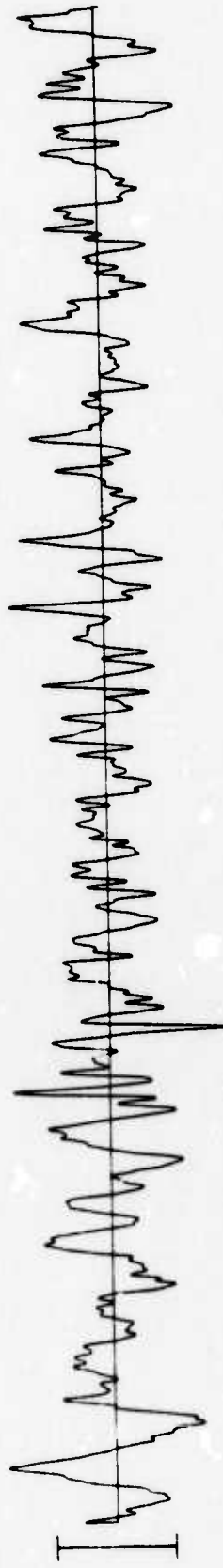
**SPZ  
25.15 MHz**



**SPR  
7.74 MHz**



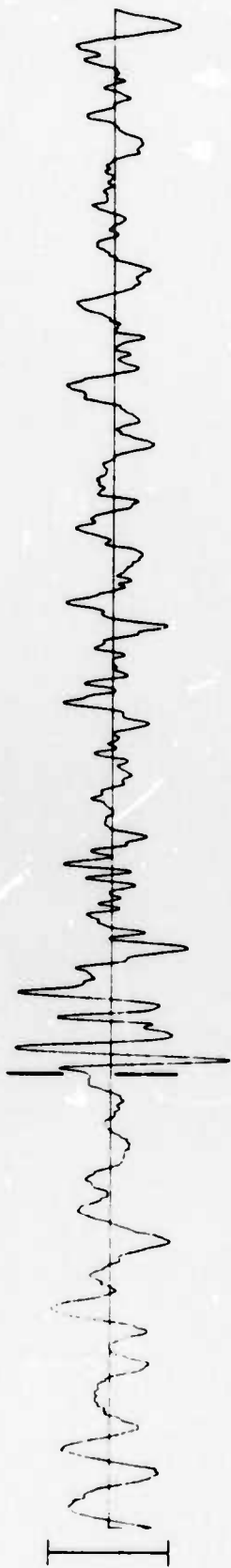
**SPT  
16.92 MHz**



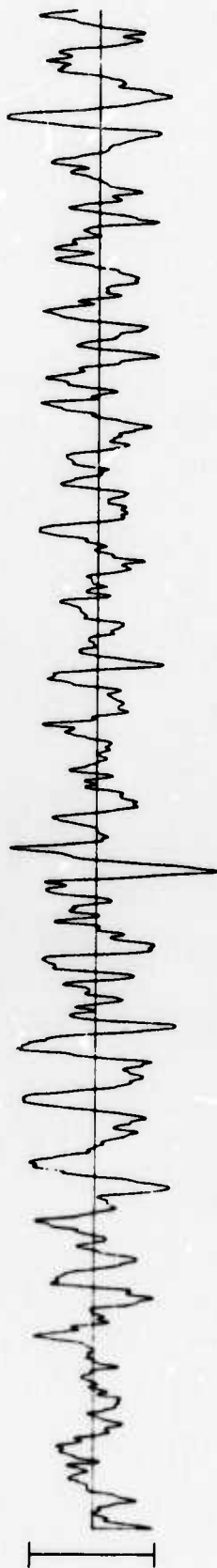
**10 SEC**

CP-SO 8 JUN 75

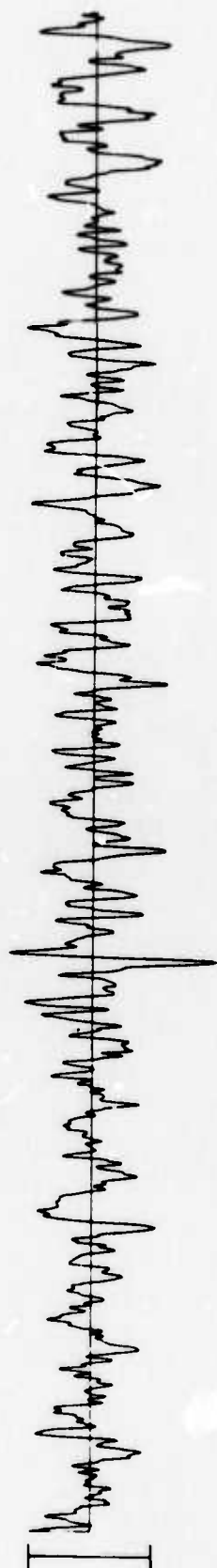
03:40:17.1



SPZ  
25.16 M $\mu$



SPR  
13.80 M $\mu$



SPT  
6.27 M $\mu$

10 SEC

9<

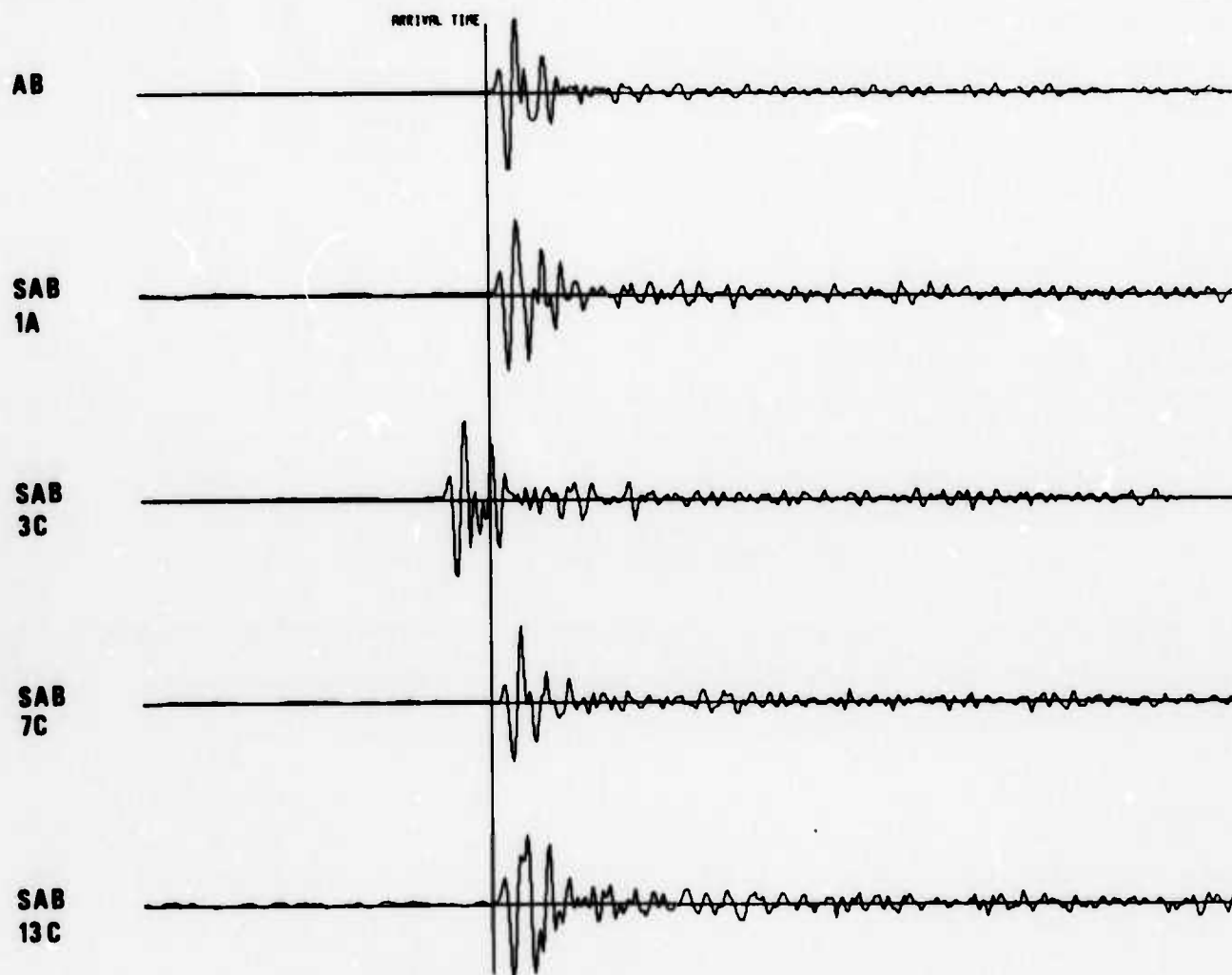
# NORSAR EVENT FILE

1975 JUN 8

EPX NO. 16240 ARR. 3.34.18.3 50.2N 77.6E 5.5MB 33KM

DIST = 37.6 AZI = 75.4 AMP = 72.0 PER = 0.9 UMETH 2

SCALE  = 5 SECONDS



# LASA

1 8 JUN 1975

2 3 26 57 48.2N 79.6E 33G B 5.7 329 EASTERN KAZAKH SSR

3 3 39 31.4 LAO P 64.2 1.0 22.5 85.5 356.1

EPX 35675

BP-B 0.6-2.0 HZ

ABN 6.5

03:39:21.4

AB 140

FAB 140

PAB1 100

PAB2 150

PAB3 160

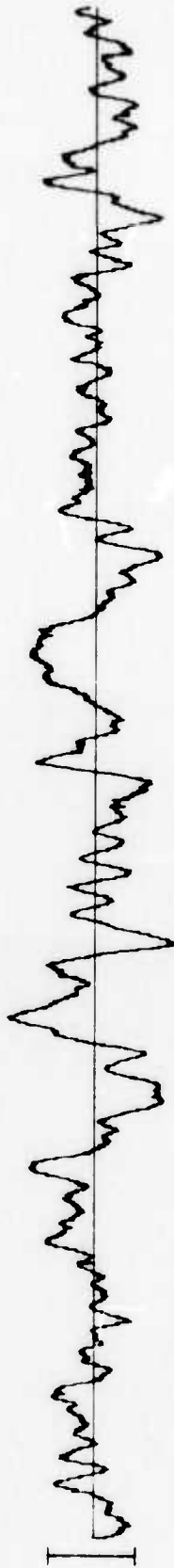
PAB4 100

11<

10 SEC

WH2YK 8 JUN 75

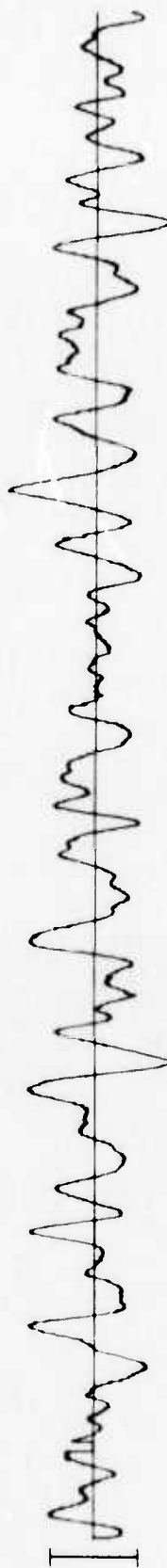
LPZ  
95.31 MP



LPR  
470.00 MP



LPT  
147.64 MP



TIME



2 MIN

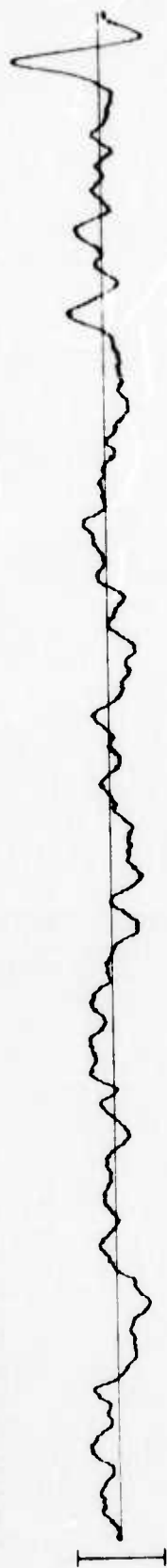
04:09:00

12<

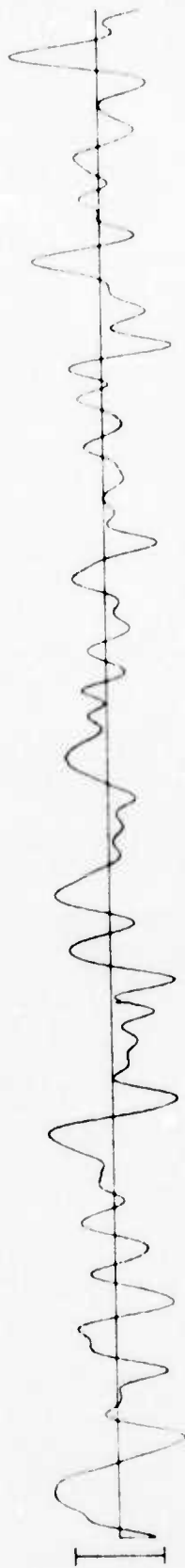


RK-ON 8 JUN 75

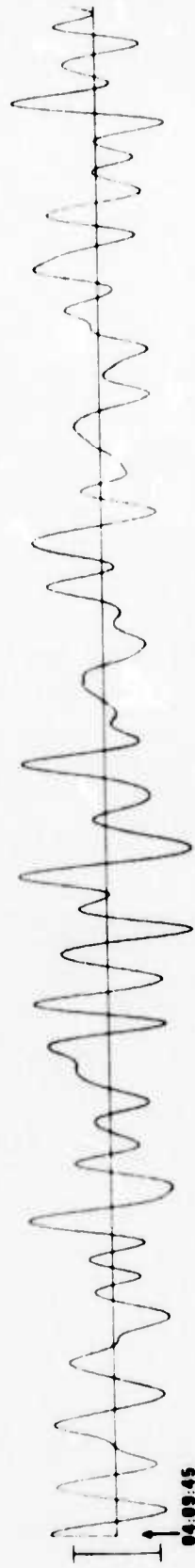
LPZ  
322.89 MHz



LPN  
UNKNOWN

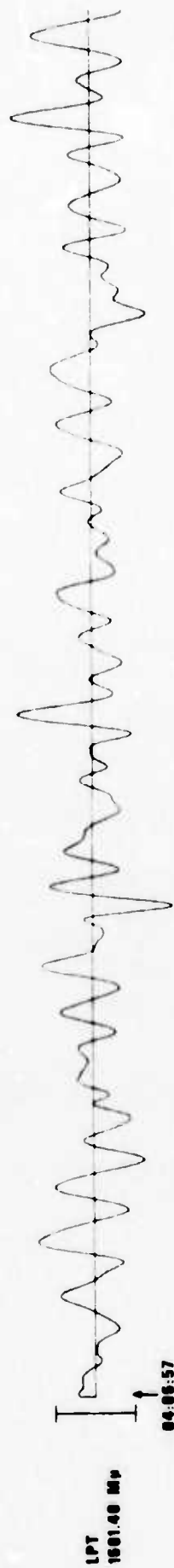
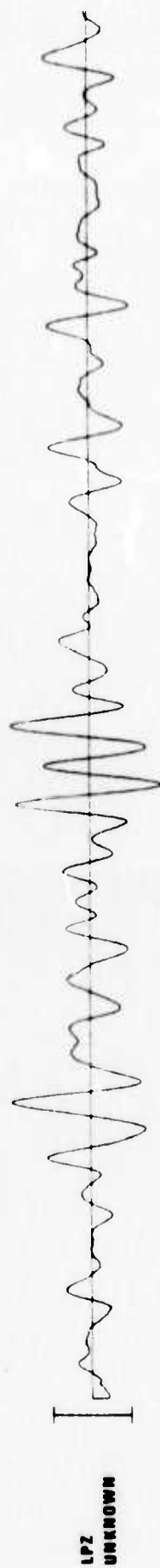


LPT  
UNKNOWN



2 MIN

HN-ME 8 JUN 75

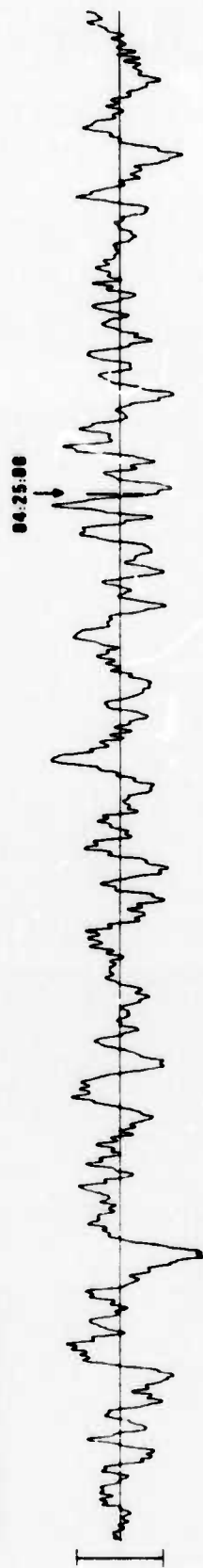


04:06:57

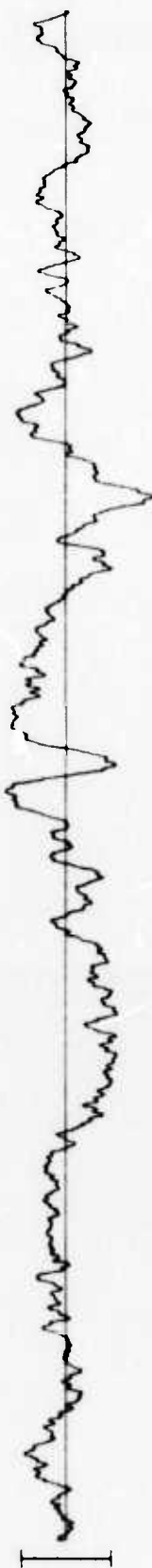
2 MIN

FN-WV 8 JUN 75

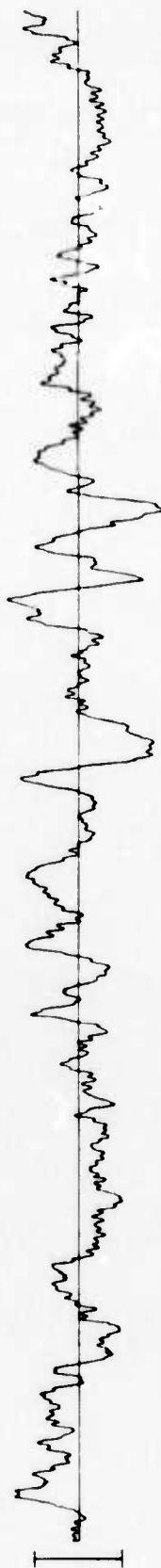
LPZ  
48.78 MP



LPR  
85.68 MP



LPT  
74.53 MP



2 MIN

CP-S0 8 JUN 75

LPZ  
119.78 MP



LPR  
122.85 MP



LPT  
106.56 MP



04:17:43

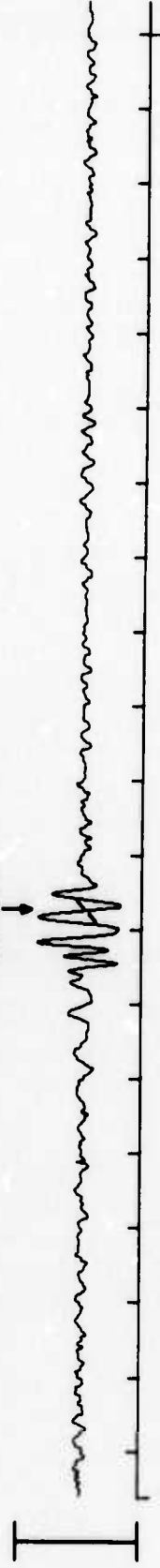
2 MIN

**NORSAR LONG-PERIOD BEAMS 8 JUN 75**

**LP VERTICAL**

**209.12 MP**

**03:50:17**



**03:42:22.0**

**1 MIN**

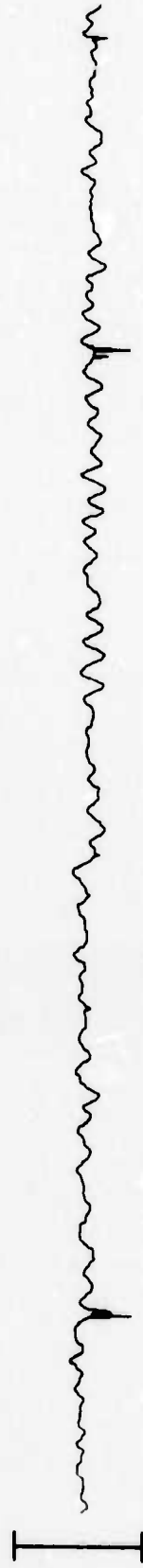
**RADIAL AND TRANSVERSE CHANNELS NOT RECOVERABLE**

**17<**

# ALPA LONG-PERIOD BEAMS 8 JUN 75

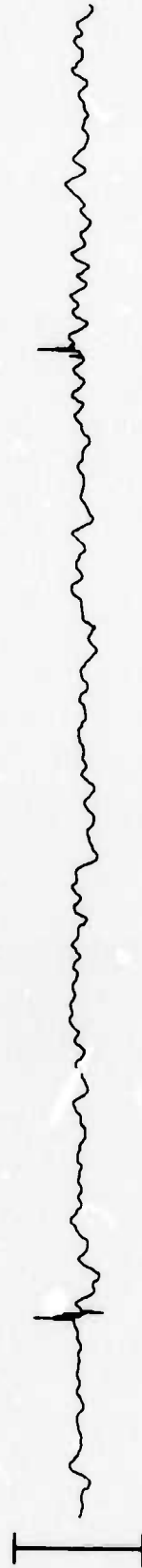
LP VERTICAL

126.34 MHz



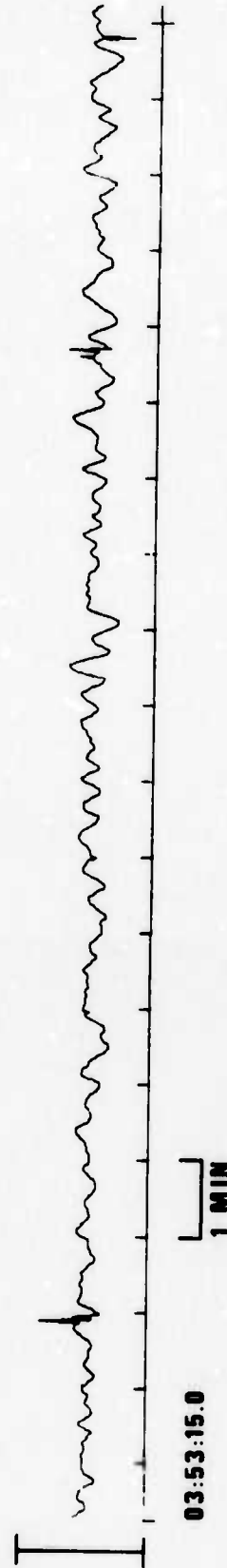
LP RADIAL

136.33 MHz



LP TRANSVERSE

90.30 MHz



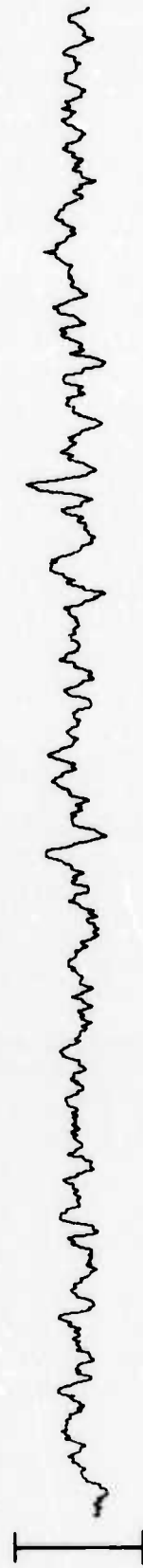
03:53:15.0

1 MIN

**LASA LONG-PERIOD BEAMS 8 JUN 75**

**LP VERTICAL**

**77.62 Mμ**



**LP RADIAL**

**69.14 Mμ**



**LP TRANSVERSE**

**70.79 Mμ**



**04:05:38.0**

**1 MIN**